

WHAT IS CLAIMED IS:

1. A composition comprising an isolated anti-inflammatory, cytoprotective compound.
2. The composition of claim 1, wherein the compound is present in an ether-extracted fraction of the probiotic-conditioned medium.
3. The composition of claim 2, wherein the compound is an organic acid.
4. The composition of claim 1, wherein the compound induces the expression of at least one heat shock protein.
5. The composition of claim 4, wherein the heat shock protein is selected from the group consisting of Hsp25 and Hsp72.
6. The composition of claim 1, wherein the compound is an inhibitor of NF- κ B activation.
7. The composition of claim 6, wherein the compound inhibits NF- κ B activation by stabilizing I κ B.
8. The composition of claim 1, wherein the compound is a proteasome inhibitor.
9. The composition of claim 8, wherein the proteasome inhibitor selectively inhibits the chymotrypsin-like activity of the proteasome.
10. The composition of claim 8, wherein the proteasome inhibitor selectively inhibits the proteasome in an epithelial cell.
11. The composition of claim 10, wherein the epithelial cell is an intestinal epithelial cell.
12. The composition of claim 1, wherein the probiotic-conditioned medium is VSL#3-conditioned medium.
13. A method for treating a patient with an inflammatory disorder comprising administering to the patient an effective amount of an isolated anti-inflammatory, cytoprotective compound derived from a probiotic-conditioned medium.

14. The method of claim 13, wherein the probiotic-conditioned medium is VSL#3-conditioned medium.
15. The method of claim 13, wherein the inflammatory disorder is an inflammatory bowel disease.
16. The method of claim 15, wherein the inflammatory bowel disease is Crohn's disease.
17. The method of claim 15, wherein the inflammatory bowel disease is ulcerative colitis.
18. The method of claim 13, wherein the compound is derived from an ether-extracted fraction of the medium.
19. The method of claim 18, wherein the compound is an organic acid.
20. The method of claim 13, wherein the compound induces the expression of at least one heat shock protein.
21. The method of claim 20, wherein the heat shock protein is selected from the group consisting of Hsp25 and Hsp72.
22. The method of claim 13, wherein the compound is an inhibitor of NF- κ B activation.
23. The method of claim 22, wherein NF- κ B activation is inhibited by stabilizing I κ B.
24. The method of claim 13, wherein the compound is an inhibitor of a protease activity.
25. The method of claim 24, wherein the inhibitor selectively inhibits a protease activity of a proteasome in an epithelial cell.
26. The method of claim 25, wherein the inhibitor selectively inhibits the chymotrypsin-like activity of the proteasome.
27. The method of claim 26, wherein the epithelial cell is an intestinal epithelial cell.

28. A pharmaceutical composition comprising an isolated anti-inflammatory, cytoprotective compound derived from a probiotic-conditioned medium and at least one pharmaceutically acceptable excipient.
29. The pharmaceutical composition of claim 28, wherein the compound is derived from an ether-extracted fraction of the medium.
30. The pharmaceutical composition of claim 29, wherein the compound is an organic acid.
31. The pharmaceutical composition of claim 28, wherein the compound induces the expression of at least one heat shock protein.
32. The pharmaceutical composition of claim 31, wherein the heat shock protein is selected from the group consisting of Hsp25 and Hsp72.
33. The pharmaceutical composition of claim 28, wherein the compound is an inhibitor of NF- κ B activation.
34. The pharmaceutical composition of claim 33, wherein the compound inhibits NF- κ B activation by stabilizing I κ B.
35. The pharmaceutical composition of claim 28, wherein the compound is a proteasome inhibitor.
36. The pharmaceutical composition of claim 35, wherein the proteasome inhibitor selectively inhibits a protease activity of a proteasome in an epithelial cell.
37. The pharmaceutical composition of claim 35, wherein the proteasome inhibitor selectively inhibits the chymotrypsin-like activity of the proteasome.
38. The pharmaceutical composition of claim 37, wherein the epithelial cell is an intestinal epithelial cell.
39. The pharmaceutical composition of claim 28, wherein the probiotic-conditioned medium is VSL#3-conditioned medium.
40. A method of producing an isolated, anti-inflammatory, cytoprotective compound comprising,
obtaining a VSL#3-conditioned medium; and

isolating an anti-inflammatory, cytoprotective compound from the VSL#3-conditioned medium, thereby producing an isolated, anti-inflammatory, cytoprotective compound.

41. A method of screening for a modulator of monocyte chemoattractant protein - 1 (MCP-1) release, comprising:

- (a) combining a candidate modulator, a probiotic-conditioned medium, and an epithelial cell;
- (b) measuring MCP-1 release by said cell; and
- (c) comparing the MCP-1 release in the presence, and absence, of said candidate modulator, wherein a difference in said MCP-1 release identifies the candidate modulator as a modulator of MCP-1 release.

42. The composition of claim 7, wherein the stabilized I κ B is phosphorylated I κ B α .

43. The method of claim 13, wherein the anti-inflammatory, cytoprotective compound does not alter the ubiquitination level of at least one protein amenable to ubiquitination in an epithelial cell exposed to said compound.

44. A method of preventing an inflammatory disorder comprising administering an effective amount of an isolated, anti-inflammatory, cytoprotective compound derived from a probiotic-conditioned medium.

45. A method of screening for a modulator of heat shock protein expression, comprising

- (a) combining a candidate modulator, a probiotic-conditioned medium, and an epithelial cell;
- (b) measuring heat shock protein expression in said cell; and
- (c) comparing the heat shock protein expression in the presence, and absence, of said candidate modulator, wherein a difference in said heat shock protein expression identifies the candidate modulator as a modulator of heat shock protein expression.

46. The method of claim 45 wherein said heat shock protein is selected from the group consisting of Hsp25 and Hsp72.

47. The method of claim 45 wherein said modulator alters the activity of Heat Shock Transcription Factor-1 (HSF-1).

48. A kit for treating or preventing an inflammatory disorder comprising a pharmaceutical composition according to claim 28 and instructions for administration of said composition to treat or prevent said disorder.